

P8502/SE**WHAT IS CLAIMED IS:***Sub D7.*

A method for displaying channel information on a digital television for receiving digital multichannel television broadcasting, comprising the steps of:

changing a current channel to a demanded major channel in response to a demand to change a major channel; and

displaying, on a television screen, minor channel numbers of programs received through a currently selected major channel.

2. The method as claimed in claim 1, wherein said minor channel numbers are displayed in order of number.

3. The method as claimed in claim 2, wherein said minor channel numbers are displayed after a currently selected major channel number.

4. The method as claimed in claim 1, further comprising the step of hiding said minor channel numbers after a prescribed time elapses.

5. The method as claimed in claim 4, further comprising the step changing a current channel to a demanded minor channel in response to a demand to change a minor channel and returning to said step of displaying of minor channel numbers.

6. The method as claimed in claim 3, further comprising the step of hiding said major channel number and said minor channel numbers after a prescribed time elapses.

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7. A method for displaying channel information on a digital television for receiving digital multichannel television broadcasting, comprising the steps of:  
selecting a radio frequency (RF) channel corresponding to a major channel number selected from a user;

5 displaying one of programs of minor channels received through a currently selected major channel by said selected RF channel as a viewing program; and  
displaying minor channel numbers received through said major channel on  
~~a television screen.~~

10 8. The method as claimed in claim 7, wherein said minor channel numbers are arranged in a prescribed direction on said television screen.

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9. The method as claimed in claim 8, wherein said minor channel numbers are sequentially arranged after said selected major channel number from the highest minor channel number.

15 10. The method as claimed in claim 7, wherein said step of displaying one of programs displays, as said viewing program, a program of the lowest minor channel number among said programs of said minor channel numbers.

11. The method as claimed in claim 8, further comprising the step of changing said viewing program by selecting a corresponding minor channel whenever a channel up or down key is pressed.

20 12. The method as claimed in claim 11, wherein said step of changing said viewing program comprises the steps of:

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if said channel up key is pressed, determining if the minor channel number of said viewing program is the highest number among said programs;

if the minor channel number of said viewing program is the highest number, displaying a program of the lowest minor channel number as said viewing program, and returning to said step of displaying minor channel numbers;

if the minor channel number of said viewing program is not the highest number, displaying a program of a higher number adjacent to the minor channel number of said viewing program, and returning to said step of displaying minor channel numbers;

if a channel down key is pressed, determining if the program number of said viewing program is the lowest number among said programs;

if the minor channel number of said viewing program is the lowest number, displaying a program of the highest minor channel number as said viewing program, and returning to said step of displaying minor channel numbers; and

if the minor channel number of said viewing program is not the lowest number, displaying a program of a lower number adjacent to the minor channel number of said viewing program, and returning to said step of displaying minor channel numbers.

13. The method as claimed in claim 8, further comprising the step of changing said viewing program by selecting a corresponding major channel and a corresponding minor channel whenever a channel up or down key is pressed.

14. The method as claimed in claim 13, wherein said step of changing said viewing program comprises the steps of:

if said channel up key is pressed, determining if the minor channel number

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of said viewing program is the highest number among said programs;

if the minor channel number of said viewing program is the highest number, selecting an RF channel of the next major channel number of said selected major channel, and returning to said step of displaying one of programs;

5 if the minor channel number of said viewing program is not the highest number, displaying a program of a higher number adjacent to the minor channel number of said viewing program as said viewing program, and returning to said step of displaying minor channel numbers;

10 if a channel down key is pressed, determining if the program number of said viewing program is the lowest number among said programs;

if the minor channel number of said viewing program is the lowest number, selecting an RF channel of the previous major channel number of said selected major channel, and returning to said step of displaying one of programs; and

15 if the minor channel number of said viewing program is not the lowest number, displaying a program of a lower number adjacent to the minor channel number of said viewing program as said viewing program, and returning to said step of displaying minor channel numbers.

15. A method for displaying channel information on a digital television for receiving digital multichannel television broadcasting, comprising the steps of:

20 displaying a channel select menu on a television screen in response to a demand from a user, wherein said channel select menu includes a scroll bar window having a scroll bar moving area split into prescribed areas so as to cover all received channels and includes a channel window for displaying channel numbers of partial channels corresponding to a position of a scroll bar;

25 determining if said scroll bar moves, and

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if said scroll bar moves, changing channel numbers on said channel window to channel numbers of channels corresponding to a position of said scroll bar.

16. The method as claimed in claim 15, further comprising the steps of:  
determining if one of channel numbers displayed on said channel window

5 is selected; and

if one of channel numbers is selected, selecting a channel of the selected channel number.

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